

## CLAIMS:

1. A method of synchronizing message transmissions between mobile nodes in an ad-hoc network using a medium access protocol, characterized in that
  - the messages are compared with one another with regard to their length and transmission rate,
  - a message is sent by a node only when it ascertains that no message is being sent by any other node, and
  - a node which receives two colliding message reports this to the sending nodes.
2. A method as claimed in claim 1, characterized in that a TDMA-type protocol is used.
3. A method as claimed in claim 1 or 2, characterized in that messages are sent by a node only with a maximum transmission rate.
4. A method as claimed in any of claims 1 to 3, characterized in that a presence message is sent by each node.
5. A method as claimed in any of claims 1 to 4, characterized in that each node has an individual transmission rate.
6. A method as claimed in any of claims 1 to 5, characterized in that a frame of a node is temporally shifted.
7. A method as claimed in any of claims 1 to 6, characterized in that a node which receives two colliding messages informs the two sending nodes that they should not send at this point in time.
8. A method as claimed in any of claims 1 to 7, characterized in that a confirmation vector is used to confirm the connection between nodes.

9. The use of the method as claimed in any of claims 1 to 8 for controlling a flow of traffic.